

Patent claims

1. A method for purifying gases escaping from a gully hole (1), which gases exit from a sewer (8) conducted in the bottom (7) of the gully hole (1), by means of a biofilter which is arranged in the gully hole (1) in such a manner that the gases pass through it before they leave the gully hole (1), characterized in that the biofilter is arranged at such a distance to the sewer (8) that its temperature and moisture are significantly influenced by the wastewater (17) present in the sewer (8).
2. The method as claimed in claim 1, characterized in that the biofilter is arranged in the lower half of the gully hole (1).
3. The method as claimed in claim 1 or 2, characterized in that, beneath the biofilter, a sealed collection space (18) having a through-hole (15) to the biofilter is constructed.
4. A wastewater-biofilter arrangement for installing a biofilter in a gully hole (1) which extends by a vertical wall (5) over an essentially horizontal sewer (8) which is arranged in a bottom (7) of the gully hole (1) to an exit hole which can be closed by a manhole (2) having a sealing arrangement (13, 22) having a through-hole and a mounting device for mounting the biofilter extending over the through-hole for carrying out the method as claimed in one of claims 1 to 3, characterized in that the sealing arrangement (13, 22) for sealing off the gully hole (1) is constructed in a lower part of the gully hole (1) and the biofilter is constructed for arranging in the lower part of the gully hole (1).

5. The wastewater-biofilter arrangement as claimed in claim 4, characterized in that the sealing arrangement (13, 22) is closed by a gas-permeable partition wall (15) forming the through-hole, on which partition wall the biofilter is arranged.
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6. The wastewater-biofilter arrangement as claimed in claim 4 or 5, characterized in that the sealing arrangement (13, 22) has sealing elements (13) for sealing on the bottom (7) on both sides of the sewer (8).
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7. The wastewater-biofilter arrangement as claimed in one of claims 4 to 6, characterized in that, for the end-side seal, sealing elements (22) directed toward the wall (5) of the gully hole (1) are provided.
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8. The wastewater-biofilter arrangement as claimed in one of claims 4 to 6, characterized in that, for the end-side seal, sealing elements suitable for close fitting to closed pipe attachments projecting into the gully hole (1) are provided.
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9. The wastewater-biofilter arrangement as claimed in one of claims 4 to 6, characterized in that the sealing arrangement has a peripheral sealing element closely fitting to the wall of the gully hole (5), the radial expansion of which sealing element is adjustable.
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10. The wastewater-biofilter arrangement as claimed in one of claims 4 to 9, characterized in that the sealing arrangement (13, 22) is situated on a lower part (10) having a gas collection space (18), and in that an upper part (11) containing the biofilter can be mounted on the lower part (10) in communicating connection via the gas-
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permeable partition wall (15).

11. The wastewater-biofilter arrangement as claimed in claim 10, characterized in that the upper part (11) is constructed in a standard size and can be mounted on lower parts (10) of different sizes.
12. A gully hole having a wastewater-biofilter arrangement (9) as claimed in one of claims 4 to 11.
13. The gully hole as claimed in claim 12, characterized in that the sewer (8) crossing the gully hole (1) is connected to a wastewater pressure line.
14. The gully hole as claimed in claim 12 or 13, characterized in that it is constructed having mounting elements for mounting the biofilter arrangement (9).